



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY  
WASHINGTON, D.C. 20460

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(RED)

OCT 31 1990

OFFICE OF  
SOLID WASTE AND EMERGENCY RESPONSE



SEMS DocID 2261723

MEMORANDUM

SUBJECT: Region III's Request for a Ceiling Increase at the Shaffer Equipment Site, Minden, West Virginia. -- **ADDENDUM**

FROM: Stephen D. Luftig, Director  
Emergency Response Division

*S. Luftig*

TO: Don R. Clay, Assistant Administrator

THRU: Henry L. Longest II, Director  
Office of Emergency and Remedial Response

*Henry L. Longest II*  
*H. L.*

PURPOSE:

Attached is a request from the Region III Regional Administrator, dated October 3, 1990, for a ceiling increase at the Shaffer Equipment Site, Minden, West Virginia. The following discussion is to address concerns raised by the Office of General Counsel, and supplements Region III's action memorandum requesting a CERCLA 104(c) emergency exemption for the proposed action.

DISCUSSION:

The following serves to amend and clarify Region III's request. The Region's request states that the current total project ceiling for the Shaffer Equipment removal action is \$3,755,447, and that a ceiling increase of \$704,790 will raise the total project ceiling to \$4,460,237. This is not correct, and should be changed to read that the current project ceiling for the Shaffer Equipment site is \$4,310,700. The ceiling increase of \$704,790 will raise the total project ceiling for removal action at this site to \$5,015,490.

This ceiling increase is required to address polychlorinated biphenyl (PCB) contaminated soil at the site. PCB concentrations in soils at the site are as high as 40,000 ppm. The site is readily accessible and subject to flooding and off-site migration of contaminants. The new contamination found in June of this year presents the same immediate human health threats posed by similarly high levels of PCBs that

existed in 1985, when a \$1 million emergency exemption was approved by the Assistant Administrator/ Office of Solid Waste and Emergency Response, for excavation and removal of PCB contaminated soil at this site. These threats are further documented in the attached October 16, 1990, memorandum from the On-Scene Coordinator.

EPA has recently scored the Shaffer Equipment site for the National Priorities List (NPL). The preliminary score was 3.5. The Region does not believe that this site will be proposed for the NPL.

The following discussion should be included to address the CERCLA requirement that a removal action contribute to the efficient performance of any long-term remedial action. The proposed actions are required to mitigate the threat to human health and the environment posed by the presence of high concentrations of hazardous substances in near-surface soils on site. These actions will contribute to the efficient performance of any long-term remedy for the site through mitigation of the near-term threat of human direct contact with hazardous substances, and through removal of the source of possible off-site release of these substances.

The cleanup level associated with the excavation of soil at this site will be consistent with TSCA PCB spill cleanup policy for non-restricted access areas.

RECOMMENDATION:

I recommend that you approve Region III's request for a ceiling increase at this site. Of the \$704,790 increase, \$590,023 will be Regional removal response allowance costs. This amount is available in the Region's first quarter FY 91 allowance. The proposed actions at the Shaffer Equipment site meet the CERCLA 104(c) criteria for an exemption from the statutory limit on removal actions, which must be met for a project ceiling increase above \$2 million. If approved, the total project ceiling will be raised from \$4,301,700 to \$5,015,490.

Approved:



Date: 10/31/90

Disapproved:

\_\_\_\_\_

Date: \_\_\_\_\_

Attachment



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY  
WASHINGTON, D.C. 20460

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OCT 29 1990

OFFICE OF  
GENERAL COUNSEL

MEMORANDUM

SUBJECT: Ceiling Increase and Exemption from \$2M Limit for  
the Shaffer Equipment Site, Minden, West Virginia

FROM: Lee R. Tyner *Lee R. Tyner*  
Attorney  
Solid Waste and Emergency Response  
Division (LE-132S)

THRU: Lisa K. Friedman *LK Friedman*  
Associate General Counsel  
Solid Waste and Emergency Response  
Division (LE-132S)

TO: Don R. Clay  
Assistant Administrator for  
Solid Waste and Emergency Response (OS-100)

We have reviewed the above-described ceiling increase and  
exemption request and do not believe that it presents any  
significant legal problems.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Region III  
841 Chestnut Building  
Philadelphia, Pennsylvania 19107

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OCT 03 1990

SUBJECT: Request for Approval of a Removal Action at the Shaffer Equipment Site, Minden, Fayette County, West Virginia

FROM: Edwin B. Erickson *[Signature]*  
Regional Administrator (3RA00)

TO: Donald R. Clay, Assistant Administrator  
Office of Solid Waste and Emergency Response (OS-100)

THRU: Henry L. Longest II, Director  
Office of Emergency and Remedial Response (OS-200)

ATTN: Steven D. Luftig, Director  
Emergency Response Division (OS-210)

I. ISSUE

The Shaffer Equipment Site in Minden, Fayette County, West Virginia, was reassessed by the OSC in May 1990, in accordance with the National Contingency Plan (NCP), 40 CFR, Part 300. The findings of this assessment indicate that a threat to human health and the environment is present. The site was addressed under a previous Removal Action that took place from December 28, 1984 through December 20, 1987. The OSC then determined that this Removal Action was complete and submitted his OSC report. However, activity that has taken place onsite since then has resulted in new contamination in areas of the site which had been cleaned up during the first Removal Action or were free of contamination. The OSC has determined that this new contamination presents a threat to public health and the environment, thereby prompting this request. Since the Removal Action was declared completed on December 20, 1987 and since the site ceiling is above \$2 million, (an exemption request was signed by your office on October 7, 1987), it is necessary to seek your approval of this funding request. The previously approved ceiling for this site was \$3,755,447. This funding request is for \$704,790 which will raise the ceiling to \$4,460,237.

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## II. BACKGROUND

### A. Site Description

The Shaffer Equipment Site initially became a CERCLA Removal Project on December 28, 1984, when acting Regional Administrator, Thomas P. Eichler approved \$175,000 to begin removal actions at the site. Since then, several additional funding requests were approved which raised the final project costs to \$3,755,447. A 6-month and \$1 million exemption request was also approved on August 29, 1985. Copies of these funding requests are attached. Removal activities taken at the site included rerouting underground water lines, site stabilization, onsite treatment of PCB-contaminated soils, removal of 4,735 tons of contaminated materials, and site restoration. The Shaffer Equipment Company was in operation during this time.

On December 10, 1987, the OSC determined that all removal operations at Shaffer were complete. On March 20 and 21, 1990, the preremedial program conducted sampling at the site. Six soil samples were found to exceed the 50 parts per million (ppm) polychlorinated biphenyl (PCB) removal action-level limit set by the OSC for this site during the first removal action.

The Removal Program was notified of these findings and an OSC was assigned to investigate and sample to confirm these findings. Samples taken on May 22, 1990, confirmed the results obtained by the preremedial program in all but one area. In general, the areas where removal actions were undertaken during 1984 and 1985 were below the 50 ppm action-level. However, areas immediately surrounding the building and areas where previous company activity occurred were found to be contaminated with PCBs in excess of 50 ppm. The OSC is of the opinion that this contamination is new, as previous sampling of these areas showed no levels of concern.

The OSC then performed a more extensive sampling to better define the contaminated areas. These results indicate that approximately one acre of property around the building and several scattered areas contain PCBs above the action level of 50 ppm. The attached Table shows sampling results and the corresponding map shows areas to which they pertain. The contamination is spotty and appears to be associated with the building cleanout by the property owner after the closure of the Shaffer Equipment Company in 1988. The chromatography of a sample from one area indicates that the PCB oil is not weathered, and was most likely dumped at the site recently.

The site is not currently on the National Priorities List (NPL). The preresidential program is in the process of conducting a site inspection to rank the site for possible listing on the NPL.

An active citizens group exists in the community. Their efforts have included seeking the assistance of Senator Rockefeller and Congressman Staggers of West Virginia. Their concerns are associated with the long-term health impact in the community. ATSDR is assisting the State Health Department in conducting a health survey. When the OSC sought cleanup advice during the first removal, an action-level of 50 ppm was selected. This level is consistent with other PCB Removal sites.

The OSC has recommended that any contamination found above the 50 ppm PCB action-level be removed in order to remain consistent with the risk-based levels already set for this site. This Action Memorandum is in support of that objective.

#### B. Quantities and Types of Substances Present

An assessment performed at the Shaffer Equipment Site by the OSC on June 14, 1990, involved random sampling in a grid around the building. Random soil samples were also collected at other locations. PCBs were detected at levels above the 50 ppm action-level. PCBs are hazardous substances according to 40 CFR 302.4.

#### C. State and Local Authorities Roles

The State of West Virginia does not have the capability to fund or manage this action. However, the West Virginia Health Department has funded and will continue to coordinate actions in conjunction with the public health assessment.

### III. THREAT TO PUBLIC HEALTH OR WELFARE AND THE ENVIRONMENT

Conditions at the Shaffer Equipment Site pose an immediate threat to human health, welfare, and the environment. Section 300.415 of the National Contingency Plan (NCP) lists the factors to be considered in determining the appropriateness of a removal action. Section 300.415, paragraphs (b)(2)(i), (iv) and (v) and (vii) apply to the situation which exists at the Shaffer Equipment Site.

- 300.415 (b)(2)(i) "Actual or potential exposure to nearby human populations, animals, or the food chain from hazardous substances, pollutants or contaminants."

Random sampling has indicated that PCB levels exceed action-levels. The site is located in a populated area with an estimated 65 to 75 residences within a 1/8-mile radius of the site. The threat of exposure to PCB contaminated soils and dusts exists to residents near the site due to the ease of access onto contaminated areas of the site. There is evidence of public trespass on the site.

300.415 (b)(2)(iv) "High levels of hazardous substances or pollutants or contaminants in soils largely at or near the surface, that may migrate."

PCB levels above the action-level exist in low lying areas of the site that are subject to flooding by Arbuckle Creek. It has been demonstrated that PCB migration via Arbuckle Creek has occurred in the past.

300.415 (b)(2)(v) "Weather conditions that may cause hazardous substances or pollutants or contaminants to migrate or be released."

As indicated above, Arbuckle Creek runs through the site and is subject to flooding during heavy precipitation events. Residents along the floodplains of the Creek are at risk from exposure to PCB contaminated sediments that may be deposited on their properties from Shaffer during flooding.

300.415 (b)(2)(vii) "Ability of other mechanisms to respond."

The State of West Virginia considers this an EPA Action and has no plans to respond.

#### IV. STATUTORY CRITERIA

A request for emergency exemption from the \$1 million statutory limit on removal actions was approved for this site on August 28, 1985. Although the present ceiling increase request is to address new contamination at the site, the conditions which met the CERCLA 104(c)(1) emergency criteria for the earlier exemption request are still applicable. These conditions are as follows:

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1. Continued response actions are immediately required to mitigate an emergency.

An estimated 2,000 people live downstream within one mile of the site. At present, due to geologic and property ownership factors, the PCB contaminated soil is located in the flood plain of Arbuckle Creek, approximately 50 yards from the stream banks. This stream commonly flows at an estimated 3,000 gallons per minute. An analysis of past flood history indicates that Arbuckle Creek can flood on the average of three times per year. Geologically, the stream and the watershed are surrounded on three sides by mountain ridges which commonly result in flash flooding. A serious flood event would involve the Shaffer Equipment Company property and would result in the erosion of contaminated soils downstream into the residential area. In fact, past history indicates that this has already occurred since PCB has been found in residential backyards as high as 17 ppm.

2. There is an immediate risk to public health and the environment.

The Centers for Disease Control (CDC) has already certified that the high levels encountered at the site present an imminent and significant public health threat. This highly contaminated soil still remains onsite. As discussed in item 1, a flood event could result in the spread of this contaminated soil directly toward and into the residential area. The OSC has determined that these levels present a significant direct contact threat to the public.

3. Assistance will not otherwise be provided on a timely basis.

The responsible parties have declined to undertake corrective actions at this site due to financial inability to do so. The CERCLA enforcement section has spent considerable effort investigating other possible responsible parties. Other than a second property owner who owns a small portion of this site, no other viable responsible parties have been located. The second property owner has declined to take action since it owns only a small portion of the affected area. As stated previously, the State of West Virginia considers this an EPA action and has no plans to respond, nor does it have the necessary resources to respond.

V. ENFORCEMENT

See Attached Confidential Enforcement Memorandum.



## VI. PROPOSED ACTIONS AND COSTS

## A. Proposed Actions

The removal actions proposed for the Shaffer Equipment Site are designed to eliminate the imminent threat to public health and the environment posed by the presence of PCBs at the site. The three-phased proposed action is as follows:

Phase I: Mobilize contractor equipment and establish an onsite command post.

Phase II: A. Excavate areas to one foot where contamination is 50 ppm (action-level) or greater.

B. Resample the excavated areas to ensure levels below action level.

C. Backfill excavated areas when clean.

D. Initiate waste disposal arrangements.

E. Demobilize all contractor equipment and personnel from site.

Phase III: Transport and dispose of hazardous waste to a TSCA-approved facility.

## B. Summary of Costs

	CURRENT CEILING	ADDITIONAL FUNDS	NEW CEILING
Extramural Costs			
ERCS Contractor	\$3,451,205	\$578,000	\$4,029,205
TAT	94,506	12,023	106,529
USCG	65,329	-	65,329
Extramural Subtotal	<u>\$3,611,040</u>	<u>\$590,023</u>	<u>\$4,201,063</u>

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**Intramural Costs**

EPA Direct	52,149	10,248	62,397
EPA Indirect	92,258	16,016	108,274
Intramural Subtotal	\$ 144,407	\$ 26,264	\$ 170,671
15% Project Contingency	-	88,503	88,503
TOTAL PROJECT CEILING	\$3,755,447	\$704,790	\$4,460,237

**VII. RECOMMENDATION**

Because the conditions at the Shaffer Equipment Site meet the criteria for a removal action under National Contingency Plan, 40 CFR, Section 300.415, and continues to meet the criteria of CERCLA 104(c)(1) for exemption from the \$2 million statutory limit. I recommend that you approve this \$704,790 ceiling increase, of which \$678,526 are Regional Allowance Costs. You may indicate your approval or disapproval by signing below.

APPROVED \_\_\_\_\_

DATE \_\_\_\_\_

DISAPPROVED \_\_\_\_\_

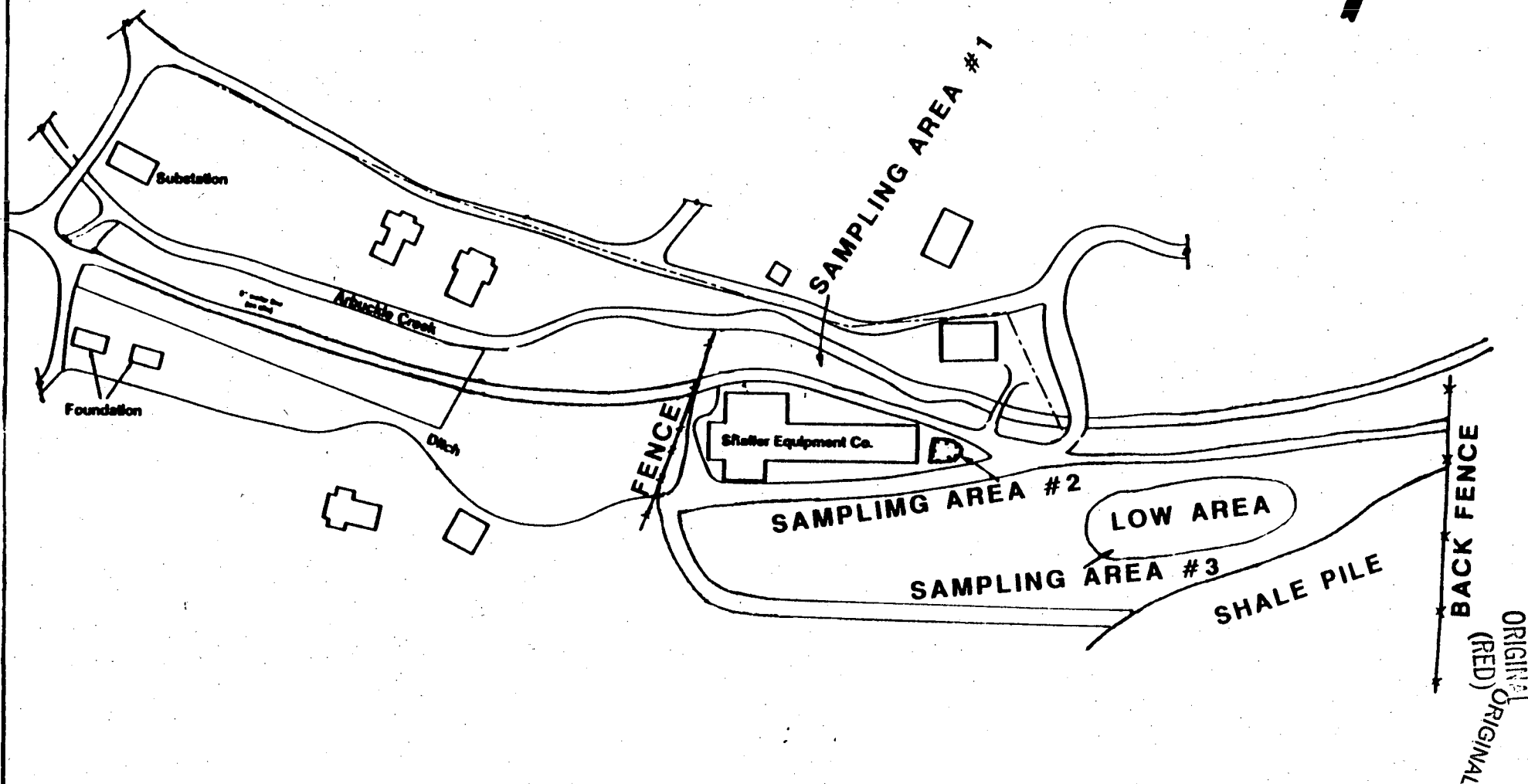
DATE \_\_\_\_\_

ATTACHMENTS: Previous funding documents  
Sampling results Table  
Sample location map

# SHAFFER EQUIPMENT COMPANY GRID SAMPLE LOCATION MAP

MINDEN, FAYETTE CO., WV

NORTH



NOT TO SCALE

ARBUCKLE CREEK

NORTH



G1  
S17

G3

G5  
S19

G7  
S21

G9

G11  
S23

G13

G2  
S18

G4

G6  
S20

SHED

G8

G10  
S22

G12

G14  
S24

ACCESS ROAD

S29

BUILDING

CONCRETE PAD

S28

S30

LEAKY  
TRANSFORMER

SHAFFER EQUIPMENT CO. SITE  
MINDEN, FAYETTE CO., WV  
SAMPLING AREA #1

NOT TO SCALE

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NORTH



ARBUCKLE CREEK

S02

BRIDGE

ACCESS ROAD

BIASED  
SAMPLING  
AREA  
S01

BUILDING

G1  
S10

G3  
S12

G5  
S14

G2  
S11

G4  
S13

S15  
G6

DEPRESSION

S16  
G7

SHAFFER EQUIPMENT CO. SITE  
MINDEN, FAYETTE CO., WV  
SAMPLING AREA #2

NOT TO SCALE

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ACCESS ROAD

NORTH



G1

G3

G5

G7

G9

S03

S05

S07

S09

LOW AREA

G2

G4

G6

G8

G10

S04

S06

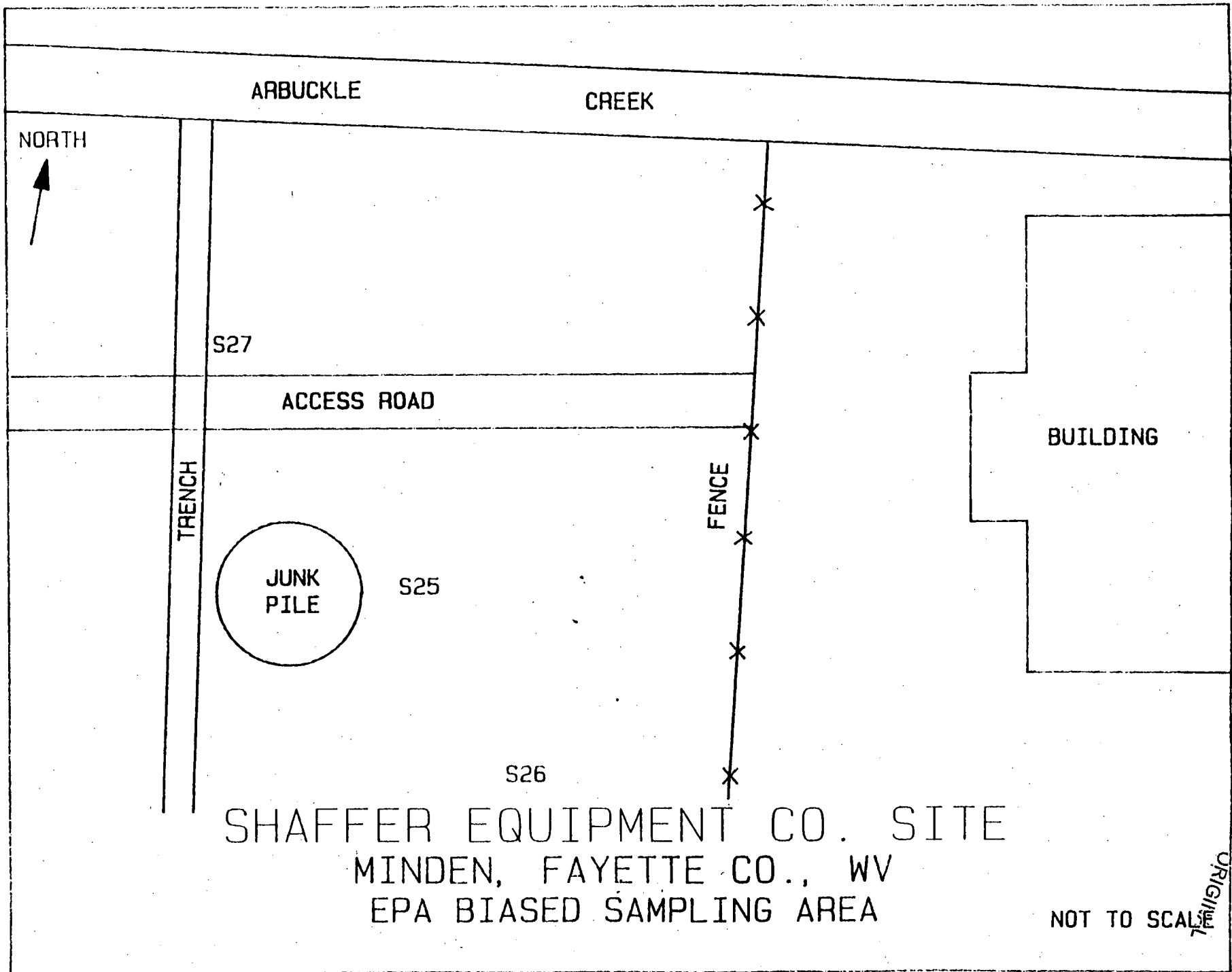
S08

SHALE PILE

SHAFFER EQUIPMENT CO. SITE  
MINDEN, FAYETTE CO., WV  
SAMPLING AREA #3

NOT TO SCALE

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SHAFFER EQUIPMENT COMPANY  
MINDEN, FAYETTE CO., WV  
ANALYTICAL FOR ASSESSMENT

SAMPLE NO.	MG/KG
S01	8.7
S02	4.0
S03	N/D
S04	1.4
S05	0.9
S06	N/D
S07	1.7
S08	2.1
S09	N/D
S10	297.0
S11	4,320.0
S12	148.0
S13	467.0
S14	164.0
S15	1,300.0
S16	29.0
S17	347.0
S18	79.2
S19	39.7
S20	74.7
S21	864.0
S22	50.9
S23	72.1
S24	2.3
S25	383.0
S26	40,300.0
S27	17.2
S28	178.0
S29	10.3
S30	2.6



CONFIDENTIAL ENFORCEMENT STATUS FOR ADDITIONAL FUNDING REQUEST  
SHAFFER EQUIPMENT SITE  
MINDEN, FAYETTE COUNTY, WEST VIRGINIA

The Enforcement and Title III Section (Enforcement) has reviewed the request for additional funding (\$704,790) for the Shaffer Equipment Site. The Site had been subject to previous removal activities during which EPA expended funds to remove and dispose contaminated soil and substances. At the time of previous removal actions, the Shaffer Equipment Company was still operational; however, the company and its principals declined to participate due to financial inviability.

The most recent contamination has been attributed to building cleanout after final closure of the operations. Accordingly, it is not likely that the company, or its principals, would be able to conduct the cleanup. A notice letter has been prepared for issuance to the Company, as well as to another party that owns part of the site property, the Berwind Corporation. Since a responsible party cleanup is not likely, it is recommended that the request for additional funding be approved.

Prepared by:  
Karen M. Wolper  
Enforcement and Title III Section  
August 10, 1990

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UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

REGION III

841 Chestnut Building  
Philadelphia, Pennsylvania 19107

OCT 16 1990

SUBJECT: Addendum to the Shaffer Equipment Action Memo

FROM: Robert E. Caron, On-Scene Coordinator  
USEPA Region III  
Eastern Response Section (3HW31)

TO: Mark Mjoness, Chief  
Eastern Operations Section (OS-210)

ISSUE:

The purpose of this memo is to clarify the nature of the threat posed by the Shaffer Equipment Site in Minden, Fayette County, West Virginia. Additional PCB contamination found in June of this year exceeds the previously determined action level of 50 ppm, prompting the need for a new Removal action.

BACKGROUND:

Sampling performed on June 12, 1990 indicated the presence of new PCB contamination in areas where previous cleanup did not occur. Sampling of these areas in 1987 did not indicate any contamination. Further investigation indicates that this contamination is new and is most likely the result of building cleanout which occurred when Shaffer Equipment ceased operations in 1988. Levels of PCB contamination are as high as 40,000 ppm.

THREAT:

The Centers for Disease Control (CDC) was consulted in December of 1984 and again in February of 1985. Memos and telephone consult records are attached. At that time CDC certified that conditions at the site presented an imminent threat to public health via direct contact due to the high levels of PCB found in onsite soils. In addition, CDC strongly recommended source control to eliminate the potential for off site migration.

The new contamination found in June of this year presents the same set of conditions that existed in 1984/1985. The site is readily accessible and still subject to flooding and off site migration of contaminants. Therefore, the OSC has determined that additional Removal actions are warranted in order to protect public health and the environment.

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**Removal Action Level of 50 ppm:**

The removal action level of 50 ppm will be used at this site in order to remain consistent with previous action levels set in 1985. This level is consistent with available guidance from the Office of Research and Development and the TSCA PCB spill cleanup policy and is considered as being protective of public health. Excavation of soil will be conducted consistent with the TSCA PCB spill cleanup policy for non-restricted access areas, followed by a backfill of at least ten inches of clean soil.

# SUPERFUND RECORD OF COMMUNICATIONS

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CHECK APPROPRIATE BLOCK(S)

- ☐ INCOMING PHONE CALL    ☒ CONFERENCE PHONE CALL    ☐ VISIT  
☐ OUTGOING PHONE CALL    ☐ MEETING/ CONFERENCE    ☐ ASSIGNMENT

DATE: 12/11/84 TIME: 8:34 PHONE NO. (Include Area Code): 572 2711

TO: (Name, Agency, Firm, and Address)

R. CARON, OSC, ERS, EPA-3

FROM: (Name, Agency, Firm, and Address)

K. GRAM, CDC, SIG  
M. MCCLANAHAN  
C. WALTERS  
D. H. DAY

ROUTING

G. JONES  
K. GRAM  
M. MCCLANAHAN  
F. ARBUCH  
FILE

SITE: SHARPLEY ELEC  
COUNTY: EMETTE STATE: WY  
EMERGENCY/IMMEDIATE  
REMEDIAL

- ☒ HEALTH CONSULTATION  
☐ SITE VISIT  
☐ REVIEW DATA  
☐ PUBLIC MEETING  
☐ WORKER HEALTH & SAFETY  
☐ OTHER: (Specify)

SUMMARY

\* DR. MCCLANAHAN CERTIFIES THAT SITE IS AN IMMINENT THREAT TO PUBLIC HEALTH GRADUATE LEVEL PCB'S IN AN AREA WHERE CONTAMINATED PHASE 2, PHASE 3

CARON: PHASE 1: FENCE; SIGNS; SOIL COVER ON CREEK; PATCH LEAKING DRAINAGE (NO EXCAVATION AT THIS TIME)  
- EXCAVATION/DISPOSAL (PHASE 4) WILL BE COMPLETED YEAR.

905 S/W LORETTA HADDOY: DISCUSSED ABOVE CURS E CDC POSITION.

ACTION REQUIRED, INFORMATION OR MATERIALS PROVIDED, ETC.

ENCLOSURE

ADVISE W. VA. H.D. OF ABOVE; DONE

TYPED NAME & SIGNATURE

DATE

12/11/84

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DEPARTMENT OF HEALTH & HUMAN SERVICES

Public Health Service  
Centers for Disease Control

Memorandum  
ORIGINAL  
(Red)

February 20, 1985

Chief, Superfund Implementation Group

Subject: Shaffer Equipment Company Site  
Minden, West Virginia

Charles J. Walters  
Public Health Advisor  
EPA Region III

The data you submitted on the above site has been reviewed within the Superfund Implementation Group. I hope that the comments will be useful.

The additional information received on this site confirms our original certification of an imminent and significant public health threat since there are areas within the site containing very high levels of contamination.

While there is also evidence of off-site migration, generally in the range of 11-17ppm PCB, the data so far received do not suggest that an off-site hazard to public health exists at this time. Eliminating the source of the contamination, as is now being done, should ensure that levels remain low in the future. Sampling should be carried out during the removal work to assure that all primary sources of PCB are removed.

As work progresses on the site, we will be happy to provide any further consultation necessary.

  
George A. Jones